

WHAT IS CLAIMED IS:

1. A device for measuring at least one parameter of an extruded flat conductor cable in a water bath that follows the extruder,
characterized in that
the flat conductor cable is guided with one of its flat sides essentially perpendicular across an ultrasonic head arranged in the water bath and
 - a) the ultrasonic head is an ultrasonic head that can be displaced crosswise to the longitudinal direction or
 - b) the ultrasonic head is a stationary ultrasonic element row that extends crosswise to the longitudinal direction of the flat conductor cable.
2. The device according to claim 1,
characterized in that
the ultrasonic head is an ultrasonic transducer.
3. The device according to claim 1,
characterized in that

the ultrasonic head is a pure ultrasonic transmitter to which an ultrasonic receiver is assigned on the opposite flat side of the flat conductor cable.

4. The device according to claim 1,

characterized in that

the displaceable ultrasonic head is provided with a position sensor.

5. The device according to claim 1,

characterized in that

the flat conductor cable is guided with its flat side across the ultrasonic head either making contact with it or at a short distance thereto.

6. The device according to claim 1,

characterized in that

the device is provided with a guiding device that comprises an interior space, is located inside the water bath and is filled with water,
the guiding device is provided with a slot,

the flat conductor cable is guided across this slot so as to make contact or at a short distance thereto and that the slot extends crosswise to the longitudinal direction and the ultrasonic head is arranged inside the interior space of the guiding device and transmits the ultrasonic waves in the direction of the slot.

7. The device according to claim 6,

characterized in that

the guiding device is essentially closed except for the slot and is provided with an opening or a pipe section through which water can be forced into the interior space of the guiding device.

8. The device according to claim 1,

characterized by

an additional measuring device for detecting or measuring one side edge or both side edges of the flat conductor cable.

9. The device according to claim 1,

characterized in that

the ultrasonic head or the ultrasonic heads is (are) embodied so as to be displaceable by being mounted rigidly on a displaceable slide or arranged inside a displaceable guiding device.

10. A method for measuring at least one parameter of an extruded flat conductor cable by measuring the flat conductor cable in a water bath after it leaves an extruder,

characterized in that

the flat conductor cable is admitted on at least one of its two flat sides essentially perpendicular with the sound waves from at least one ultrasonic head and

a) an ultrasonic head is used which can be displaced crosswise to the longitudinal direction of the flat conductor cable, or

b) the ultrasonic head used is a stationary ultrasonic element row which extends across the width of the flat conductor cable

and

the parameter or the parameters to be measured is(are) determined with the aid of one or several reflected ultrasonic echoes.

11. The method according to claim 10,

characterized in that

the reflected ultrasonic echo is evaluated as A-scan and/or as amplitude image and is displayed as function of the transverse direction of the flat conductor cable.

12. The method according to claim 10,

characterized in that

one or several of the following measures are realized:

a) the ultrasonic head is either an ultrasonic transducer or a pure ultrasonic transmitter, wherein an ultrasonic sensor is assigned to the ultrasonic transmitter on the opposite side of the flat conductor cable,

b) during the measuring operation, the ultrasonic head is displaced crosswise to the longitudinal direction of the

flat conductor cable and its position is detected relative to the reference edge of the flat conductor cable,

c) the flat conductor cable is guided with its flat side across the ultrasonic head, such that it makes contact or is disposed at a short distance thereto,

d) a device is used which has a guiding device comprising an interior space, wherein the guiding device has a slot across which the flat conductor cable is guided such that it either makes contact or is disposed at a short distance to the slot, the slot extends crosswise to the longitudinal direction, and the ultrasonic head is arranged in the interior space of the guiding device and transmits the ultrasonic waves in the direction of the slot.